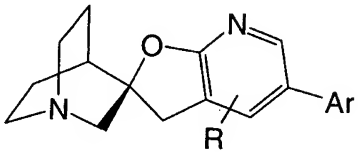
Amendments to the Claims:

This listing of claims will replace all previous versions, and listings, of claims in this application.

Listing of Claims:

1. (original) A compound having the formula:



I

and pharmaceutically-acceptable salts thereof, wherein

Ar is selected from a 2-, or 3-linked furyl, benzofuryl or isobenzofuryl; substituted with 1, 2 or 3 substitutents, or, when a benzofuryl or isobenzofuryl with 0, 1, 2, or 3 substituents, independently selected at each occurrence from C_{1-4} alkyl, C_{1-4} alkoxy, C_{1-4} halogenated alkyl, C_{1-4} oxygenated alkyl, C_{2-4}alkenyl, C_{2-4}alkynyl, halogen, $-CO_2R^1$, $-C(O)R^1$, –CN, $–NO_2$, $-(CH_2)_nNR^1R^2$;

n is 0, 1, or 2;

R^1 and R^2 are independently selected at each occurrence from hydrogen or C_{1-4}alkyl;

R is a substituent selected from hydrogen, C_{1-4}alkyl, C_{1-4} halogenated alkyl, C_{1-4} oxygenated alkyl, or halogen.

2. (original) A compound according to Claim 1 or a pharmaceutically-acceptable salt thereof, wherein:

Ar is a 2-, or 3-linked furyl ring bearing a single substituent and said substituent is selected from methyl, ethyl, or halogen, and

R is hydrogen.

3. (original) A compound according to Claim 1, selected from:

(2'R)-5'-(benzofuran-2-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine];
(2'R)-5'-(2-bromofuran-3-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine];
(2'R)-5'-(5-methylfuran-2-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine];
(2'R)-5'-(5-fluorofuran-2-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine];
(2'R)-5'-(5-methylfuran-3-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine];
(2'R)-4-{spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridin-5'-yl}furan-2-carboxaldehyde;
(2'R)-5'-(5-hydroxmethylfuran-3-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine];
(2'R)-4-{spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridin-5'-yl}furan-2-carbonitrile;
(2'R)-5-{spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridin-5'-yl}furan-2-carbonitrile;
(2'R)-5'-(benzofuran-3-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine];
(2'R)-5'-(2-fluorobenzofuran-3-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine];
(2'R)-5'-(5-fluorofuran-3-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine];
(2'R)-5'-(5-chlorofuran-3-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine];
(2'R)-5'-(5-bromofuran-3-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine];
(2'R)-5'-(5-trifluoromethylfuran-3-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine];
(2'R)-5'-(5-aminomethylfuran-3-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine];
(2'R)-5'-(5-chlorofuran-2-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine];
(2'R)-5'-(5-bromofuran-2-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine];
(2'R)-5'-(5-trifluoromethylfuran-2-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine];
(2'R)-5'-(5-aminomethylfuran-2-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine];
(2'R)-5'-(2,3-dimethylfuran-4-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine],
or
(2'R)-5'-(2,3-dimethylfuran-5-yl)spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine].

4. (original) A pharmaceutical composition comprising a compound according to Claim 1, and a pharmaceutically-acceptable diluent or carrier.

5 - 13 (cancelled)

14. (original) A method of treatment or prophylaxis of human diseases or conditions in which activation of the α_7 nicotinic receptor is beneficial which comprises administering a therapeutically effective amount of a compound according to Claim 1.

15. (original) A method of treatment or prophylaxis of psychotic disorders or intellectual impairment disorders, which comprises administering a therapeutically effective amount of a compound according to Claim 1.

16. (original) The method according to Claim 15, wherein said psychotic disorder is Alzheimer's disease, learning deficit, cognition deficit, attention deficit, memory loss, Attention Deficit Hyperactivity Disorder Parkinson's disease, Huntington's disease, Tourette's syndrome, a neurodegenerative disorder in which there is loss of cholinergic synapses anxiety, schizophrenia or mania or manic depression.

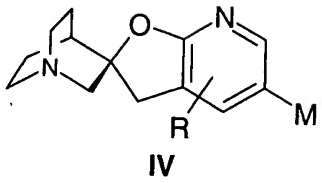
17. (original) A method of treatment or prophylaxis of jetlag, cessation of smoking, nicotine addiction, craving, pain, and for ulcerative colitis, which comprises administering a therapeutically effective amount of a compound according to Claim 1.

18. (original) A compound according to Claim 1, wherein one or more of the atoms is a radioisotope of the element.

19. (original) A compound according to Claim 18, wherein the radioisotope is tritium.

20 (cancelled)

21. (original) A compound of formula IV:



IV

wherein:

M is $B(OH)_2$, $B(OR^3)_2$ or $SnR^3{}_3$;

R is a substitutent selected from hydrogen, C_{1-4}alkyl, C_{1-4} halogenated alkyl, C_{1-4} oxygenated alkyl, or halogen, and

R^3 is a C_1-C_6 alkyl group.

22. (original) A compound according to Claim 21 which is (2'R)-5'-trimethylstannyl-spiro[1-azabicyclo[2.2.2]octane-3,2'(3'H)-furo[2,3-b]pyridine].